

REMARKS

Claims 1-33 are pending for consideration. In view of the following remarks, Applicant respectfully traverses the Office's rejections and requests that the application be forwarded on to issuance.

§ 103 Rejections

Claims 1, 10, 11 and 19 stand rejected under 35 U.S.C. §103(a) over U.S. Patent No. 6,226,642 to Beranek et al. (hereinafter "Beranek") in view of U.S. Patent No. 6,510,458 to Berstis et al. (hereinafter "Berstis").

Claims 2-9, 14 and 15 stand rejected under 35 U.S.C. §103(a) over Beranek in view of Berstis in further view Patent Application Publication No. US 2003/0018506 A1 to McLean et al. (hereinafter "McLean").

Claims 12, 13, 16-18, 20 and 21 stand rejected under 35 U.S.C. §103(a) over Beranek.

Claim 22 stands rejected under 35 U.S.C. §103(a) over Beranek in view of EP Application No. 0 939 516 A2 to Robinson.

Claims 23, 24-28 and 30-33 stand rejected under 35 U.S.C. §103(a) over Beranek in view of Robinson in further view of U.S. Patent No. 5,961,602 to Thompson et al. (hereinafter "Thompson") and McLean.

Claim 29 stands rejected under 35 U.S.C. §103(a) over Beranek in view of Robinson, Thompson and McLean in further view of Patent Application Publication No. US 2002/0026507 A1 to Sears et al. (hereinafter "Sears").

Before discussing the substance of the Office's rejections, the following discussion of Applicant's disclosure and the Beranek reference is provided in an

1 attempt to assist the Office in appreciating the patentable distinctions between
2 Applicant's claimed embodiments and the cited references.

4 Applicant's Disclosure

5 Applicant's disclosure, as such pertains to the claimed subject matter,
6 concerns a system and related interfaces supporting the processing of media
7 content. In accordance with various embodiments, a method for processing a
8 *development project* comprises generating a *source chain* for use in a development
9 project, and *caching the source chain* when it is not currently required in the
10 development project. As execution of the development project continues, or
11 during a subsequent project, if the source processing chain is required, it is
12 retrieved from cache, modified as necessary to meet the needs of the development
13 project, and integrated into the development project.

14 With respect to *development projects* and *source chains*, consider the
15 following. Source processing chains or source chains (also referred to as *filter*
16 *graphs*), can comprise different types of filters, e.g. source filters, transform
17 filters, and rendering filters. A source filter is typically used to load data from
18 some source; a transform filter processes and passes data; and a rendering filter
19 renders data to a hardware device or other locations (e.g., saved to a file, etc.).
20 An example of a filter graph or source processing chain for a simplistic media
21 rendering process is shown Fig. 1.

22 The illustrated source chain is comprised of a plurality of filters 102-114,
23 which read, process (transform) and render media content from a selected source
24 file. As shown, the filter graph includes each of the types of filters described
25 above, interconnected in a linear fashion. Filter graphs, such as the one shown in

1 Fig. 1, can typically be used in the context of user-defined development projects
2 such as multi-media editing projects.

3 As additional context with respect to user-defined development projects,
4 consider the following in connection with Figs. 9 and 10, which shows a user-
5 defined editing project in accordance with embodiments described in the
6 specification. In this example, when a user creates an editing or development
7 project, they can select from a number of different multimedia clips that they can
8 then assemble into a unique presentation. Each individual clip represents a *source*
9 of digital data or a source stream (e.g., multimedia content). Projects can include
10 one or more sources 902. In defining their project, a user can operate on sources
11 in different ways. For example, video sources can have *transitions* 904 and *effects*
12 906 applied on them. A transition object is a way to change between two or more
13 sources. A transition essentially receives as input, two or more streams, operates
14 on them in some way, and produces a single output stream. An exemplary
15 transition can comprise, for example, fading from one source to another. An effect
16 object can operate on a single source or on a composite of sources. An effect
17 essentially receives a single input stream, operates on it in some way, and
18 produces a single output stream. An exemplary effect can comprise a black-and-
19 white effect in which a video stream that is configured for presentation in color
20 format is rendered into a video stream that is configured for presentation in black
21 and white format. Effect object 906 may actually perform multiple tasks on the
22 received input stream.

23 An exemplary user interface 908 is shown and represents what a user might
24 see when they produce a multimedia project with software executing on a
25 computer. In this example, the user has selected three sources A, B, and C, and

1 has assembled the sources into a project timeline. The project timeline defines
2 when the individual sources are to be rendered, as well as when any transitions
3 and/or effects are to occur.

4 As noted in the specification, conventional implementations of a filter
5 graph manager required a source processing chain be constructed for each access
6 to a source. Thus, a literal implementation of the dynamic graph building feature
7 introduced in the specification might well have the adverse affect of requiring that
8 multiple accesses to a source would require that a commensurate number of
9 processing chains be constructed, i.e., one for each time the filter string was
10 dynamically added to the filter graph. As described in the specification,
11 performance improvements may be achieved by reducing the number of times a
12 processing chain or filter graph is created to retrieve media content from a
13 particular source.

14 In accordance with at least some embodiments, filter chains can be cached
15 for subsequent use within a development project (e.g. later in the execution of the
16 filter graph) and for use across development projects.

17 18 The Beranek Reference

19 Beranek is directed to method of controlling how a Web document is
20 presented for display on a browser of a Web appliance. The Web appliance
21 typically includes a television class monitor. The Web document typically is
22 formatted according to a markup language such as HTML and the method uses a
23 client side HTTP caching proxy to intercept the Web document and then
24 dynamically rewrite the document before it is displayed on the browser of the Web
25 appliance. In particular, as the Web document is received from the server, the

1 HTML is parsed to identify the format of the document and the information
2 therein. A filter mechanism is then used to reformat the Web document according
3 to some given protocol, and the re-formatted Web document is then passed to the
4 browser for display on the monitor. As Beranek instructs, dynamic alteration of
5 the HTML in this manner enables control of the "look and feel" of the browser
6 display irrespective of the monitor resolution and/or quality.

7 At this point, and in view of the discussion of Applicant's disclosure above,
8 what should begin to emerge is an understanding that Applicant's disclosure (and
9 claimed embodiments) and the systems and methods in Beranek are really two
10 very different things, as will become apparent in the discussion below.

11 12 The §103 Standard

13 To establish a *prima facie* case of obviousness, three basic criteria *must* be
14 met. First, there must be some suggestion or motivation, either in the references
15 themselves or in the knowledge generally available to one of ordinary skill in the
16 art, to modify the reference or to combine reference teachings. *In re Jones*, 958
17 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992); *In re Fine*, 837 F.2d 1071, 5
18 USPQ2d 1596 (Fed. Cir. 1988). Second, there must be a reasonable expectation
19 of success. *In re Merck & Co., Inc.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir.
20 1986). Finally, the prior art reference (or references when combined) must teach
21 or suggest *all* the claim limitations. *In re Royka*, 490 F.2d 981, 180 USPQ 580
22 (CCPA 1974).

23 Hence, when patentability turns on the question of obviousness, the search
24 for and analysis of the prior art includes evidence relevant to the finding of
25 whether there is a teaching, motivation, or suggestion to select and combine the

1 references relied on as evidence of obviousness. See, e.g., *McGinley v. Franklin*
2 *Sports, Inc.*, 262 F.3d 1339, 1351-52, 60 USPQ2d 1001, 1008 (Fed. Cir. 2001)
3 ("the central question is whether there is reason to combine [the] references," a
4 question of fact drawing on the Graham factors).

5 "The factual inquiry whether to combine references must be thorough and
6 searching." *Id.* It must be based on objective evidence of record. This precedent
7 has been reinforced in myriad decisions, and cannot be dispensed with. See, e.g.,
8 *Brown & Williamson Tobacco Corp. v. Philip Morris Inc.*, 229 F.3d 1120, 1124-
9 25, 56 USPQ2d 1456, 1459 (Fed. Cir. 2000) ("a showing of a suggestion,
10 teaching, or motivation to combine the prior art references is an 'essential
11 component of an obviousness holding'" (quoting *C.R. Bard, Inc. v. M3 Systems,*
12 *Inc.*, 157 F.3d 1340, 1352, 48 USPQ2d 1225, 1232 (Fed. Cir. 1998)); *In re*
13 *Dembiczak*, 175 F.3d 994, 999, 50 USPQ2d 1614, 1617 (Fed. Cir. 1999) ("Our
14 case law makes clear that the best defense against the subtle but powerful
15 attraction of a hindsight-based obviousness analysis is rigorous application of the
16 requirement for a showing of the teaching or motivation to combine prior art
17 references."); *In re Dance*, 160 F.3d 1339, 1343, 48 USPQ2d 1635, 1637 (Fed.
18 Cir. 1998) (there must be some motivation, suggestion, or teaching of the
19 desirability of making the specific combination that was made by the applicant); *In*
20 *re Fine*, 837 F.2d 1071, 1075, 5 USPQ2d 1596, 1600 (Fed. Cir. 1988) ("teachings
21 of references can be combined only if there is some suggestion or incentive to do
22 so.") (emphasis in original) (quoting *ACS Hosp. Sys., Inc. v. Montefiore Hosp.*,
23 732 F.2d 1572, 1577, 221 USPQ 929, 933 (Fed. Cir. 1984)).

24 The need for specificity pervades this authority. See, e.g., *In re Kotzab*, 217
25 F.3d 1365, 1371, 55 USPQ2d 1313, 1317 (Fed. Cir. 2000) ("particular findings

1 must be made as to the reason the skilled artisan, with no knowledge of the
2 claimed invention, would have selected these components for combination in the
3 manner claimed").

4 In view of the above-described Standard, Applicant respectfully submits
5 that the Office has failed to establish a *prima facie* case of obviousness.

6
7 **The §103 Rejections**

8 **Claim 1** recites a method comprising:

- 9
- 10 • loading one or more *source processing chains* to support execution
of a *development project*; and
 - 11 • *determining whether each of the one or more processing chains*
12 *will be subsequently required* during execution of this or another
development project and, *if so, caching those filter chains* which
13 will be subsequently required.

14 In making out the rejection of this claim, the Office argues that Beranek
15 teaches one or more processing chains (referring to a Web document and citing to
16 column 2, lines 25-50; column 9, lines 7-47; and column 10, lines 21-67). The
17 Office also argues that Beranek teaches a development project (referring to the
18 browser and citing to column 10, lines 21-67; column 2, lines 25-50; and column
19 13, lines 40-67). The Office also argues that Beranek teaches processing chains
20 (referring to data streams and citing to column 13, lines 40-67). The Office also
21 argues that Beranek teaches execution of development projects citing to column 2,
22 lines 19-53.

23 Applicant very respectfully disagrees with the Office's interpretation of
24 Beranek and its application to the presently claimed subject matter. Specifically,
25 nowhere does Beranek even remotely disclose or suggest "source processing

1 chains” as that term is utilized in the claims and defined in the specification.
2 Specifically, in the discussion above under the heading “Applicant’s Disclosure”,
3 Applicant points out, for contextual purposes, characteristics that are associated
4 with exemplary source processing chains. Applicant very respectfully submits
5 that a “web document” is not a “source processing chain”.

6 Furthermore, Applicant has pointed out what is meant by a “development
7 project”. The Office argues that Beranek’s browser meets this subject matter.
8 Applicant respectfully disagrees. A cursory reading of Applicant’s specification
9 should indicate that a browser is not a “development project” as that term is
10 utilized in the specification and claims.

11 Beranek simply fails to disclose or suggest the subject matter that the
12 Office argues it does. Hence, for at least this reason, the Office has failed to
13 establish a *prima facie* case of obviousness and this claim is allowable.

14 The Office then admits that Beranek does not teach caching filter chains.
15 Applicant must necessarily agree because Beranek does not, in fact, even remotely
16 suggest filter chains as that term is utilized in the specification. The Office then
17 relies on Berstis and argues that Berstis teaches filtering web pages to determine
18 when the web pages are saved to the cache. Applicant must very respectfully
19 again point out that “source processing chains” are not “web documents”. Thus,
20 to this extent, Berstis’s teachings are simply irrelevant. Hence, for at least this
21 additional reason, this claim is allowable as the Office has failed to establish a
22 *prima facie* case of obviousness.

23 Claims 2-11 depend from claim 1 and are allowable as depending from an
24 allowable base claim. These claims are also allowable for their own recited
25 features which, in combination with those recited in claim 1, are neither disclosed

1 nor suggested in the references of record, either singly or in combination with one
2 another. Given the allowability of these claims in view of the misinterpretation
3 and application of Beranek and Berstis, the rejections based on the further
4 combinations with McLean and McAllister are not seen to add anything of
5 significance.

6 **Claim 12** recites a method comprising:

- 7
- 8 • generating a *source chain* for use in a *development project*; and
 - 9 • *caching the source chain* when it is not currently required in the development project.
- 10

11 In making out the rejection of this claim, the Office relies solely upon
12 Beranek and argues that it discloses source chains and development projects as
13 those terms are utilized in the specification. As noted above, Applicant very
14 respectfully disagrees with the Office and submits that the Office has
15 misinterpreted Beranek. Specifically, Beranek's web documents and browser are
16 simply not, respectively, "source chains" and "development projects", as those
17 terms are defined in the claims and specification. Accordingly, the Office has
18 failed to establish a *prima facie* case of obviousness and this claim is allowable.

19 **Claims 13-21** depend from claim 12 and are allowable as depending from
20 an allowable base claim. These claims are also allowable for their own recited
21 features which, in combination with those recited in claim 12, are neither disclosed
22 nor suggested in the references of record, either singly or in combination with one
23 another. In addition, given the allowability of these claims in view of the
24 misinterpretation and application of Beranek, the rejections based on the further
25

1 combinations with McLean and McAllister are not seen to add anything of
2 significance.

3 **Claim 22** recites a system comprising:

- 4
- 5 • a plurality of sources; and
 - 6 • an *interface*, selectively coupled to the plurality of sources, to
7 *generate and implement a development project of processing*
8 *chains*, wherein the *interface loads a processing chain for each of*
9 *the plurality of media sources at a point during the execution of*
10 *the project* when the chain is required, and wherein *the interface is*
11 *configured to unload at least a subset of the chains when they are*
12 *not required.*

13 In making out the rejection of this claim, the Office argues that Beranek
14 discloses processing chains (citing to Beranek's web documents) and a
15 development project (citing to Beranek's browser). As noted above, this is simply
16 not the case. For reasons set forth above, Applicant respectfully submits that the
17 Office has misinterpreted and misapplied Beranek. Specifically, Beranek's web
18 documents are not processing chains. Likewise, Beranek's browser is not a
19 development project. Applicant has described, in the section entitled "Applicant's
20 Disclosure" above, exemplary characteristics of processing chains and
21 development projects. From that discussion alone it should be readily apparent
22 that Beranek does not remotely disclose or suggest any such notions.
23 Accordingly, the Office has failed to establish a *prima facie* case of obviousness
24 and this claim is allowable. In view of the Office's misinterpretation of Beranek,
25 the rejection of this claim based on the combination with Robinson is not seen to
add anything of significance.

1 **Claims 23-33** depend from claim 22 and are allowable as depending from
2 an allowable base claim. These claims are also allowable for their own recited
3 features which, in combination with those recited in claim 22, are neither disclosed
4 nor suggested in the references of record, either singly or in combination with one
5 another. In addition, given the allowability of these claims in view of the
6 misinterpretation and application of Beranek, the rejections based on the further
7 combinations with Thompson, McLean, Anderson, Sears and McAllister are not
8 seen to add anything of significance.

9
10 **Conclusion**

11 All of the claims are in condition for allowance and Applicant respectfully
12 requests a Notice of Allowability be issued forthwith. In the event that the
13 Office's next action is anything other than issuance of a Notice of Allowability,
14 Applicant respectfully requests that the undersigned be contacted for the purpose
15 of scheduling an interview.

16
17
18 Dated: 1/2/04

Respectfully Submitted,

By 

Lance R. Sadler
Reg. No. 38,605
(509) 324-9256